

AMENDMENTS TO THE CLAIMS

1-25. (Cancelled)

26. (Currently Amended) A method for stimulating an immune response in a human comprising:

administering by a route selected from the group consisting of inhalation, intranasal, parenteral, oral and intradermal to the human as an immunopotentiator an amount of a phosphorothioate oligonucleotide analog effective to stimulate a cell-mediated immune response, wherein the phosphorothioate oligonucleotide analog stimulates the cell-mediated immune response through a non-is-not antisense mechanism.

27. (Previously Presented) The method of claim 26, wherein the phosphorothioate oligonucleotide analog is an immunopotentiator of an antibody response.

28. (Previously Presented) The method of claim 26, wherein the human has cancer.

29. (Previously Presented) The method of claim 26, wherein the human has an infection.

30. (Previously Presented) The method of claim 26, wherein the human is having surgery.

31. (Previously Presented) The method of claim 26, wherein the phosphorothioate analog is formulated in a vehicle selected from the group consisting of liposomes and cationic lipids.

32. (Previously Presented) The method of claim 26, wherein all of the internucleotide linkages of the phosphorothioate oligonucleotide analog are phosphorothioate linkages.

33. (Previously Presented) The method of claim 26, wherein the phosphorothioate oligonucleotide analog includes at least one 2'-O-alkyl modification.

34. (Previously Presented) The method of claim 33, wherein the 2'-O-alkyl modification is a 2'-O-methyl modification.

35. (Previously Presented) The method of claim 33, wherein the 2'-O-alkyl modification is a 2'-O-propyl modification.

36. (Previously Presented) The method of claim 26, further comprising administering a therapeutic modality, before, after or simultaneously with the phosphorothioate oligonucleotide analog.

37. (Previously Presented) The method of claim 36, wherein the therapeutic modality is a drug.

38. (Previously Presented) A method for stimulating a cell-mediated immune response in a human comprising:

administering to the human as an immunopotentiator an amount of a phosphorothioate oligonucleotide analog formulated in a vehicle selected from the group consisting of liposomes and cationic lipids effective to stimulate the cell-mediated immune response, wherein the phosphorothioate oligonucleotide analog is not antisense.

39. (Previously Presented) The method of claim 38, wherein the phosphorothioate oligonucleotide analog is an immunopotentiator of an antibody response.

40. (Previously Presented) The method of claim 38, wherein the human has cancer.

41. (Previously Presented) The method of claim 38, wherein the human has an infection.

42. (Previously Presented) The method of claim 38, wherein the human is having surgery.

43. (Previously Presented) The method of claim 38, wherein all of the internucleotide linkages of the phosphorothioate oligonucleotide analog are phosphorothioate linkages.

44. (Previously Presented) The method of claim 38, wherein the phosphorothioate oligonucleotide analog includes at least one 2'-O-alkyl modification.

45. (Previously Presented) The method of claim 44, wherein the 2'-O-alkyl modification is a 2'-O-methyl modification.

46. (Previously Presented) The method of claim 44, wherein the 2'-O-alkyl modification is a 2'-O-propyl modification.

47. (Previously Presented) The method of claim 38, further comprising administering a therapeutic modality, before, after or simultaneously with the phosphorothioate oligonucleotide analog.

48. (Previously Presented) The method of claim 47, wherein the therapeutic modality is a drug.